REMARKS

This application has been reviewed in light of the Office Action dated December 29, 2004. Claims 1-19 are pending in the application. By the present amendment, claims 1 and 13 have been amended. No new matter has been added. The Examiner's reconsideration of the rejection in view of the amendment and the following remarks is respectfully requested.

By the Office Action, claims 1-11, 13-16 and 18 stand rejected under 35 U.S.C. §103(a) as being unpatentable over Voit et al. (U.S. Patent No. 6,424,657), hereinafter Voit, in view of Chaddha (U.S. Patent No. 6,392,705), hereinafter Chaddha. The Applicants respectfully disagree with the rejection.

Voit is directed to a subscriber-based system where the subscriber selects a desired image resolution for a video delivery system. Voit provides grades or levels of service. In other words, the speed at which data is provided is purchased by a subscriber. (See Voit col. 5, lines 28-40). This presupposes that all users can receive the full speed service if desired. This is not the case for distance users and the present invention seeks to solve this problem.

In addition, Voit provides different quality levels or tiers of service of the same content. Each signal is subscribed to in advance and each signal represents the entire video signal. The signal of Voit is not selected based upon sub-signals having different levels of image detail and being combinable such that a greater number of sub-signals being combined provides higher image resolution, importance levels or based on available bandwidth.

Chaddha is directed to a system where layers of data are formed for temporal or spatial scalability. The main goal of the layers provided by Chaddha is to support streaming video over the Internet, which can be provided to a plurality of different network groups. Chaddha transmits as much data as possible and users select the amount of data that they can handle.

Contrast this with the present invention, which takes a video signal and separates it into sub-signals. These sub-signals are combinable and include a level of importance. If a subscriber can handle all of the bandwith, then all of the sub-signals can be received independently over separate channels (e.g., ATM channels) and combined to reform a highest possible resolution signal.

In Chaddha, the data is divided into layers and transmitted over a plurality of channels. The data is often redundant and may be pruned by encoders (see col. 15, lines 1-30) when they are using too much bandwidth, meaning that if a user receives all of the layers some of the data would need to be discarded. If a given network has the ability, it can decode all the frames and eliminate the redundant information.

Chaddha deals with bandwidth issues through spatial and temporal regimes. For the spatial solution, three display resolutions are transmitted. A base transmission is provided, which includes a smallest screen size resolution and enhancement layers permit a decoder to upsample the base layer to achieve higher resolution. For the temporal solution, frames are separated out and sent in different temporal layers. The frames of temporal layers are removed as needed to achieve a desired frame rate. Redundant frames are pruned.

The techniques employed by Chaddha are significantly different from the present invention, which independently transmits combinable sub-signals over different channels. A user subscribes to a greater number of channels if he/she can handle greater bandwidth. In addition, the video sub-signals have different levels of image detail and are combinable such that a greater number of sub-signals being combined provides higher image resolution. This is not disclosed or suggested by Voit and/or Chaddha, either taken alone of in combination.

The cited combination of Voit and Chaddha fails to disclose or suggest, *inter alia,* separating a digitally compressed video signal into multiple sub-signals, the sub-signals (or video layers in claim 13) having different levels of image detail and being combinable such that a greater number of sub-signals being combined provides higher image resolution, ... transmitting each of said sub-signals independently over asynchronous transfer mode (ATM) paths ... and selecting certain ones of said sub-signals according to the level of importance and according to a bandwidth suitable for subsequent reception over a digital subscriber line (DSL) path, as set forth in claim 1 and essentially as in claim 13.

The cited combination of Voit and/or Chaddha does not disclose or suggest, at least: sub-signals having different levels of image detail and are combinable such that a greater number of sub-signals being combined provides higher image resolution, and that these sub-signals are transmitted independently over asynchronous transfer mode (ATM) paths, and further that the sub-signals are selected according to the level of importance and according to

a bandwidth suitable for subsequent reception over a digital subscriber line (DSL) path, as set forth in claims 1 and claim 13.

The present invention separates a compressed video signal into sub-signals; the sub-signals have different levels of importance, but are constituent parts of the same video signal. For the present invention, the more bandwidth that is available, the more importance levels are received and the better the picture.

It is therefore respectfully submitted that the present invention is not disclosed or suggested by the cited reference taken alone or in combination. The overall concepts of the present invention are not fairly suggested by the prior art, and the prior art fails to disclose or suggest sat least several claimed aspects of the present invention. The claims 1 and 13 and their dependent claims 2-12 and 13-19 are believed to be in condition for allowance for at least the reasons stated. Early and favorable reconsideration of the case is respectfully requested.

By the Office Action, claim 12 stands rejected under 35 U.S.C. §103(a) as being unpatentable over Voit in view of Chaddha and further in view of Fadavi-Ardekani et al. (U.S. Patent No. 6,707,822) hereinafter Fadavi. Claims 17 and 19 stand rejected under 35 U.S.C. §103(a) as being unpatentable over Voit in view of Chaddha and further in view of Cooperman et al. (U.S. Patent No. 6,768,777) hereinafter Cooperman. The Applicants respectfully disagree with these rejections for at least the reasons stated above.

In view of the foregoing amendments and remarks, it is respectfully submitted that all the claims now pending in the application are in condition for allowance. Early and favorable reconsideration of the case is respectfully requested.

Please charge the $120 fee for the 1 month Petition for Extension of Time, and any other costs that may be associated with the filing of this response, to Deposit Account No. 07-0832.

Respectfully submitted,

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